PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Mar 7 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_001

Site ID: S2017FL097001

Pedon ID: S2017FL097001

Site Note: This site was DSNY-001; it was sampled about 11 meters (38 feet) at 220 degrees of the SW_001 corner. This was a north facing pit. the aspect was 135 degrees, on a 1.5 % gradient. This Pedon is representative of the Zolfo Series and representative of the map unit concept and site.; The plants described on this site correlates well to the legacy ecological site 3-Sand Scrub, but the designated legacy ecological site for this soil was 11 - Upland Hardwood Hammock. The set of plants fits both. The site 3-Sand Scrub correlates well to Pine Flatwoods and Dry Prairie (Shrubby Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name is Immokalee fine sand. The Component Pedon was Zolfo. Zolfo was not included as a minor component of the mapunit. However is a similar soil to Pomello and Pomello was included as a minor component of this mapunit. Zolfo and Pomello are in higher positions within the flatwood landscape that the map unit was delineated. Landscape, vegetation and hydrology of this site fits the mapping concept of the area.; Seasonal high water table at 51 centimeters (20 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0638

Soil Name as Described/Sampled: Zolfo

Classification: Sandy, siliceous, hyperthermic Oxyaquic Alorthods

Soil Name as Correlated: Zolfo

Classification: Sandy, siliceous, hyperthermic Oxyaquic Alorthods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: microhigh on rise tread of flatwoods on marine terrace on coastal plain
microhigh on rise tread of microhigh rise on marine terrace on coastal plain

Upslope Shape: convex

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Country:

State: Florida

County: Osceola

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL097 -- Osceola County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 16 -- Immokalee fine sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0965270

Std Longitude: -81.4187360

Latitude: 28 degrees 5 minutes 47.50 seconds north

Longitude: 81 degrees 25 minutes 7.45 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 458865 meters

UTM Northing: 3107966 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: Chapman oak, longleaf pine, runner oak, saw palmetto, slash pine, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL097001 **Pedon ID:** S2017FL097001

Diagnostic Features: ochric epipedon 0 to 130 cm.
albic horizon 10 to 130 cm.
aquic conditions 51 to 203 cm.
endosaturation 51 to 203 cm.
spodic horizon 130 to 203 cm.

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.5	20.0	135	22.0			1,300	360	somewhat poorly		

A--0 to 10 centimeters (0.0 to 3.9 inches); dark gray (10YR 4/1) fine sand, gray (10YR 6/1), dry; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout and common coarse roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03218

E1--10 to 51 centimeters (3.9 to 20.1 inches); gray (10YR 5/1) fine sand; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout and common coarse roots throughout; . Lab sample # 17N03219

E2--51 to 130 centimeters (20.1 to 51.2 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 3 percent distinct 10YR 3/2), moist, organic stains on surfaces along root channels; common fine and medium prominent spherical black (10YR 2/1) and very dark gray (10YR 3/1) organic streaking throughout. Lab sample # 17N03220

Bh--130 to 203 centimeters (51.2 to 79.9 inches); very dark gray (10YR 3/1) fine sand; weak fine angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; .

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018
Description Date: Mar 2 2017
Describer: Martin Figueroa, Craig Prink and Jimmy Maynes
NEON Plot ID: DSNY_004
Site ID: S2017FL097004

Country:
State: Florida
County: Osceola
MLRA: 155 -- Southern Florida Flatwoods
Soil Survey Area: FL097 -- Osceola County, Florida
7-FOR -- Ft. Myers, Florida

Pedon ID: S2017FL097004
Map Unit: 5 -- Basinger fine sand

Site Note: This site was DSNY-004; it was sampled about 12 meters (41 feet) at 220 degrees of the SW_004 corner. This was north facing of the pit, the aspect was 135 degrees, on a 1.0 % gradient. This Pedon is representative of Myakka Series and fits the map unit concept of the area.; The Map unit Name is Basinger fine sand. The Component Pedon was Myakka. This is a minor inclusion that was not mapped or inluded within the map unit composition. The Myakka soil fits the Landscape, vegetation and hydrology of the area. This inclusion is representative of the mapping concept.; This site is in the transition area between two map units and a shallow rise.; Seasonal high water table at 34 centimeters (9 inches).; The plants described on this site correlates well to the legacy ecological site 6-SOuth Florida Flatwoods. The site 6-South Florida Flatwoods correlates well to Pine Flatwoods and Dry Prairie (Wet Flatwoods) from FNAI Natural Communities of Florida publication.

Pit Location:

Pedon Note:
Lab Source ID: KSSL
Lab Pedon #: 17N0639
Soil Name as Described/Sampled: Myakka
Classification: Sandy, siliceous, hyperthermic Aeric Alaquods
Soil Name as Correlated: Myakka
Classification: Sandy, siliceous, hyperthermic Aeric Alaquods
Pedon Type: undefined observation
Pedon Purpose: research site
Taxon Kind: series
Associated Soils:
Physiographic Division:
Physiographic Province:
Physiographic Section:
State Physiographic Area:
Local Physiographic Area:
Geomorphic Setting: on talf tread of flat on marine terrace on coastal plain
Upslope Shape: linear
Cross Slope Shape: linear
Particle Size Control Section: 25 to 100 cm.
Description origin: Pedon PC 6.3
Diagnostic Features: ochric epipedon 0 to 61 cm.
albic horizon 10 to 61 cm.
spodic horizon 61 to 89 cm.

Quad Name: Lake Hatchineha, Florida
Std Latitude: 28.0995680
Std Longitude: -81.4001500

Latitude: 28 degrees 5 minutes 58.44 seconds north
Longitude: 81 degrees 24 minutes 0.54 seconds west
Datum: WGS84
UTM Zone: 17
UTM Easting: 460692 meters
UTM Northing: 3108297 meters

Primary Earth Cover: Tree cover
Secondary Earth Cover: Other tree cover
Existing Vegetation: Indiangrass, large gallberry, longleaf pine, saw palmetto, wiregrass gentian
Parent Material: sandy marine deposits
Bedrock Kind:
Bedrock Depth:
Bedrock Hardness:
Bedrock Fracture Interval:
Surface Fragments:
Description database: KSSL

Cont. Site ID: S2017FL097004 **Pedon ID:** S2017FL097004

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	18.0	135	22.0			1,300	360	poorly		

A--0 to 10 centimeters (0.0 to 3.9 inches); black (10YR 2/1) fine sand, dark gray (10YR 4/1), dry; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; many medium roots throughout and many fine roots throughout and common coarse roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03221

Eg1--10 to 41 centimeters (3.9 to 16.1 inches); gray (10YR 5/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and common fine roots throughout; common fine distinct spherical light gray (10YR 7/1) stripped matrix throughout, common fine distinct irregular very dark gray (10YR 3/1) organic streaking throughout, common light gray (10YR 7/1)uncoated sand grains throughout; gradual smooth boundary. Lab sample # 17N03222

Eg2--41 to 61 centimeters (16.1 to 24.0 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; common fine and medium distinct irregular very dark brown (10YR 2/2) organic streaking throughout; clear wavy boundary. Lab sample # 17N03223

Bh1--61 to 76 centimeters (24.0 to 29.9 inches); very dark brown (10YR 2/2) fine sand; moderate fine angular blocky, and moderate medium angular blocky structure; moderately hard, firm, nonsticky, nonplastic; nonfluid; common fine roots throughout; gradual wavy boundary. Lab sample # 17N03224

Bh2--76 to 89 centimeters (29.9 to 35.0 inches); dark brown (7.5YR 3/2) fine sand; moderate fine angular blocky, and moderate medium angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common fine roots throughout; gradual wavy boundary. Lab sample # 17N03225

Bw1--89 to 107 centimeters (35.0 to 42.1 inches); dark brown (7.5YR 3/4) fine sand; structureless single grain; soft, very friable, nonsticky, nonplastic; nonfluid; common fine roots throughout; 5 percent distinct 10YR 3/2), moist, organic stains on surfaces along root channels; 3% spodic fragments; clear smooth boundary. Lab sample # 17N03226

Bw2--107 to 137 centimeters (42.1 to 53.9 inches); yellowish brown (10YR 5/4) fine sand; structureless single grain; soft, very friable, nonsticky, nonplastic; nonfluid; 5 percent distinct 10YR 5/2), moist, organic stains on surfaces along root channels; clear wavy boundary.

Cg1--137 to 173 centimeters (53.9 to 68.1 inches); light brownish gray (2.5Y 6/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; gradual wavy boundary.

Cg2--173 to 203 centimeters (68.1 to 79.9 inches); grayish brown (10YR 5/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; .

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 28 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_006

Site ID: S2017FL097006

Pedon ID: S2017FL097006

Site Note: The plants described on this site correlates well to the legacy ecological site 3-Sand Scrub. The site 3-Sand Scrub correlates well to Pine Flatwoods and Dry Prairie (Shrubby Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name is Satellite sand. The Component Pedon was Satellite. Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; This site was DSNY-006; it was sampled about 12 meters (40 feet) at 225 degrees of the SW_006 corner.This was north facing of the pit, the aspect was 135 degrees, on a 1.5 % gradient. This Pedon is representative of the Satellite Series and representative of the map unit concept and site.; Seasonal high water table at 48 centimeters (19 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0640

Soil Name as Described/Sampled: Satellite

Classification: Hyperthermic, uncoated Aquic Quartzipsamments

Soil Name as Correlated: Satellite

Classification: Hyperthermic, uncoated Aquic Quartzipsamments

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: microhigh on rise tread of flatwoods on marine terrace on coastal plain
microhigh on rise tread of microhigh rise on marine terrace on coastal plain

Upslope Shape: convex

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: aquic conditions 48 to 107 cm.
endosaturation 51 to 203 cm.

Country:

State: Florida

County: Osceola

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL097 -- Osceola County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 41 -- Satellite sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0928100

Std Longitude: -81.3994620

Latitude: 28 degrees 5 minutes 34.12 seconds north

Longitude: 81 degrees 23 minutes 58.14 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 460757 meters

UTM Northing: 3107548 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: Chapman oak, Florida slash pine, large gallberry, longleaf pine, runner oak, saw palmetto, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL097006 **Pedon ID:** S2017FL097006

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.5	19.0	135	22.0			1,300	360	somewhat poorly		

A--0 to 10 centimeters (0.0 to 3.9 inches); gray (10YR 5/1) fine sand, gray (10YR 6/1), dry; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout and common coarse roots throughout; common fine prominent irregular black (10YR 2/1) charcoal masses throughout; clear wavy boundary. Lab sample # 17N03227

C1--10 to 41 centimeters (3.9 to 16.1 inches); 60 percent light brownish gray (10YR 6/2) and 40 percent light gray (10YR 7/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout and common coarse roots throughout; gradual wavy boundary. Lab sample # 17N03228

C2--41 to 119 centimeters (16.1 to 46.9 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 3 percent faint 10YR 3/1), moist, organic stains on surfaces along root channels; 3 percent fine distinct spherical 10YR 5/4), moist, masses of oxidized iron Throughout; common fine prominent irregular very dark gray (10YR 3/1) organic streaking throughout; gradual wavy boundary. Lab sample # 17N03229

C3--119 to 203 centimeters (46.9 to 79.9 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 10 percent prominent 10YR 3/1), moist, organic stains on surfaces along root channels; 5 percent fine prominent spherical 10YR 5/4), moist, masses of oxidized iron Throughout.

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Mar 14 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_010

Site ID: S2017FL097010

Pedon ID: S2017FL097010

Site Note: This site was DSNY-010; it was sampled about 10 meters (33 feet) at 210 degrees of the SW_010 corner. This was a north facing of the pit, the aspect was 135 degrees, on a 1.0 % gradient. This pedon is representative of the Smyrna soil series, and is representative of the map unit concept and site.; The plants described on this site correlates well with the legacy ecological site 6-South Florida Flatwoods. The site 6-South Florida Flatwoods correlates well to Pine Flatwoods and Dry Prairie (Mesic Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit name is Smyrna fine sand. The Component Pedon was Smyrna. Landscape, vegetation and hydrology of this site fits the mapping concept of the area.; Seasonal high water table 25 centimeters (10 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0641

Soil Name as Described/Sampled: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Soil Name as Correlated: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: on talf tread of flatwoods on marine terrace on coastal plain

Upslope Shape: linear

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 48 cm.
albic horizon 13 to 48 cm.
spodic horizon 48 to 64 cm.
spodic materials 64 to 152 cm.

Country:

State: Florida

County: Osceola

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL097 -- Osceola County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 42 -- Smyrna fine sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.1184220

Std Longitude: -81.4352800

Latitude: 28 degrees 7 minutes 6.32 seconds north

Longitude: 81 degrees 26 minutes 7.01 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 457249 meters

UTM Northing: 3110397 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: arrowhead, bluestem, large gallberry, longleaf pine, runner oak, saw palmetto, slash pine, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL097010 **Pedon ID:** S2017FL097010

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	19.0	135	22.0			1,300	360	poorly		

A--0 to 13 centimeters (0.0 to 5.1 inches); very dark gray (10YR 3/1) fine sand, gray (10YR 5/1), dry; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; many medium roots throughout and many fine roots throughout and common coarse roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03230

E--13 to 48 centimeters (5.1 to 18.9 inches); gray (10YR 6/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and common fine roots throughout and common coarse roots throughout; common medium distinct spherical light gray (10YR 7/1) stripped matrix throughout, common fine distinct irregular very dark gray (10YR 3/1) organic streaking throughout; clear smooth boundary. Lab sample # 17N03231

Bh1--48 to 56 centimeters (18.9 to 22.0 inches); black (10YR 2/1) fine sand; moderate fine angular blocky, and moderate medium angular blocky structure; moderately hard, firm, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; gradual wavy boundary. Lab sample # 17N03232

Bh2--56 to 64 centimeters (22.0 to 25.2 inches); 50 percent dark reddish brown (5YR 3/2) and 50 percent dark reddish brown (5YR 3/3) fine sand; weak fine angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; gradual wavy boundary. Lab sample # 17N03233

Bw--64 to 81 centimeters (25.2 to 31.9 inches); 80 percent dark yellowish brown (10YR 4/4) and 20 percent light yellowish brown (10YR 6/4) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 2 percent distinct 10YR 3/1), moist, organic stains on surfaces along root channels; common fine and medium distinct spherical dark reddish brown (5YR 3/2) spodic materials throughout; clear wavy boundary. Lab sample # 17N03234

C1--81 to 152 centimeters (31.9 to 59.8 inches); 90 percent pale yellow (2.5Y 7/3) and 10 percent light gray (2.5Y 7/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common fine roots throughout; 2 percent prominent 10YR 3/1), moist, organic stains on surfaces along root channels; 3 percent fine distinct spherical 10YR 5/8), moist, masses of reduced iron Throughout; 1 percent medium distinct irregular moderately cemented 10YR 6/4), moist, feldspar minerals throughout; common fine and medium prominent spherical dark reddish brown (5YR 3/2) spodic materials throughout; clear wavy boundary. Lab sample # 17N03235

C2--152 to 203 centimeters (59.8 to 79.9 inches); grayish brown (10YR 5/2) fine sand, loamy fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; 3 percent fine distinct spherical 10YR 5/8), moist, masses of reduced iron Throughout.

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Mar 9 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_015

Site ID: S2017FL097015

Pedon ID: S2017FL097015

Site Note: This site was DSNY-015; it was sampled about 13 meters (42 feet) at 200 degrees of the SW_015 corner. This was north facing of the pit, the aspect was 135 degrees, on a 1.5 % gradient. This Pedon is represenative of Cassia soil series and is representative of the map unit concept and site.; The plants described on this site correlates well with the legacy ecological site 6-South Florida Flatwoods and 3-Sand Pine Scrub. This is a micro high or riser within the flatwoods so 3-Sand Pine Scrub will be a better fit for this particular site. 3-Sand Pine Scrub correlates to Pine Flatwoods and Dry Prairie (Scrubby Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit name was Satellite sand. The Component of the Pedon is Cassia. Cassia soils is part of the included soil inclusions of the map unit. Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; Seasonal high water table at 51 centimeters (20 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0642

Soil Name as Described/Sampled: Cassia

Classification: Sandy, siliceous, hyperthermic Oxyaquic Alorthods

Soil Name as Correlated: Cassia

Classification: Sandy, siliceous, hyperthermic Oxyaquic Alorthods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: microhigh on rise tread of flatwoods on marine terrace on coastal plain
microhigh on rise tread of microhigh rise on marine terrace on coastal plain

Upslope Shape: convex

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Country:

State: Florida

County: Osceola

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL097 -- Osceola County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 41 -- Satellite sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.1116520

Std Longitude: -81.4217960

Latitude: 28 degrees 6 minutes 41.95 seconds north

Longitude: 81 degrees 25 minutes 18.47 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 458571 meters

UTM Northing: 3109643 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: Chapman oak, large gallberry, longleaf pine, runner oak, saw palmetto, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL097015 **Pedon ID:** S2017FL097015

Diagnostic Features: ochric epipedon 0 to 74 cm.
albic horizon 13 to 74 cm.
endosaturation 51 to 203 cm.
spodic horizon 74 to 115 cm.
spodic materials 115 to 152 cm.

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.5	20.0	135	22.0			1,300	360	somewhat poorly		

A--0 to 13 centimeters (0.0 to 5.1 inches); dark gray (10YR 4/1) fine sand, gray (10YR 5/1), dry; structureless single grain; soft, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout and common coarse roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03236

E1--13 to 51 centimeters (5.1 to 20.1 inches); light brownish gray (10YR 6/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and many fine roots throughout and common coarse roots throughout; gradual smooth boundary. Lab sample # 17N03237

E2--51 to 74 centimeters (20.1 to 29.1 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and common fine roots throughout; common fine and medium distinct spherical white (10YR 8/1) stripped matrixes throughout, common medium prominent irregular very dark gray (10YR 3/1) organic streaking throughout; clear smooth boundary. Lab sample # 17N03238

Bh--74 to 115 centimeters (29.1 to 45.3 inches); 65 percent black (10YR 2/1) and 35 percent dark reddish brown (5YR 3/3) fine sand; weak medium angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; clear wavy boundary. Lab sample # 17N03239

Bw--115 to 152 centimeters (45.3 to 59.8 inches); brown (10YR 5/3) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common fine distinct spherical dark brown (7.5YR 3/3) spodic materials; gradual wavy boundary.

C--152 to 203 centimeters (59.8 to 79.9 inches); pale yellow (2.5Y 7/3) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; .

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018
Description Date: Mar 7 2017
Describer: Martin Figueroa, Craig Prink and Jimmy Maynes
NEON Plot ID: DSNY_023
Site ID: S2017FL097023

Country:
State: Florida
County: Osceola
MLRA: 155 -- Southern Florida Flatwoods
Soil Survey Area: FL097 -- Osceola County, Florida
7-FOR -- Ft. Myers, Florida

Pedon ID: S2017FL097023
Map Unit: 42 -- Smyrna fine sand

Site Note: This site was DSNY-023; it was sampled about 12 meters (41 feet) at 225 degrees of the SW_023 corner. This was north facing of the pit, the aspect was 135 degrees, on a 1.0 % gradient. This pedon is within the ranges of Basinger Soil Series. Basinger soil series is representative of the map unit concept and site.; The legacy ecological site for Basinger is 26-Slough. The 26-Slough occurs within the 6-South Florida Flatwoods. That explains the set of vegetation described on this site. The plants correlate to 6-South Florida Flatwoods. The 6-South Florida Flatwoods correlates to Pine Flatwoods and Dry Prairie (Mesic Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name was Smyrna fine sand. The Component Pedon was Basinger. Basinger is a minor component of the map unit. Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; Seasonal high water table at 3 centimeters (1 inches).

Pit Location:

Pedon Note:
Lab Source ID: KSSL
Lab Pedon #: 17N0644
Soil Name as Described/Sampled: Basinger
Classification: Siliceous, hyperthermic Spodic Psammaquents

Soil Name as Correlated: Basinger
Classification: Siliceous, hyperthermic Spodic Psammaquents
Pedon Type: undefined observation
Pedon Purpose: research site
Taxon Kind: series
Associated Soils:
Physiographic Division:
Physiographic Province:
Physiographic Section:
State Physiographic Area:
Local Physiographic Area:
Geomorphic Setting: microlow on talf tread of flat on marine terrace on coastal plain
Upslope Shape: linear
Cross Slope Shape: linear
Particle Size Control Section: 25 to 100 cm.
Description origin: Pedon PC 6.3
Diagnostic Features: ochric epipedon 0 to 115 cm.
albic horizon 10 to 115 cm.
spodic horizon 115 to 203 cm.

Quad Name: Lake Hatchineha, Florida
Std Latitude: 28.0946420
Std Longitude: -81.4233480

Latitude: 28 degrees 5 minutes 40.71 seconds north
Longitude: 81 degrees 25 minutes 24.06 seconds west
Datum: WGS84
UTM Zone: 17
UTM Easting: 458412 meters
UTM Northing: 3107759 meters

Primary Earth Cover: Tree cover
Secondary Earth Cover: Other tree cover
Existing Vegetation:
Parent Material: sandy marine deposits
Bedrock Kind:
Bedrock Depth:
Bedrock Hardness:
Bedrock Fracture Interval:
Surface Fragments:
Description database: KSSL

Cont. Site ID: S2017FL097023 **Pedon ID:** S2017FL097023

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	19.0	135	22.0			1,300	360	very poorly		

A--0 to 10 centimeters (0.0 to 3.9 inches); black (10YR 2/1) fine sand, dark gray (10YR 4/1), dry; weak fine angular blocky, and weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; 10 percent fine prominent spherical 5YR 5/8), moist, masses of reduced iron Throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03243

Eg1--10 to 20 centimeters (3.9 to 7.9 inches); dark gray (10YR 4/1) fine sand, gray (10YR 6/1), dry; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; 5 percent medium prominent irregular 5YR 5/8), moist, masses of reduced iron Throughout and 15 percent fine prominent irregular 5YR 5/8), moist, masses of reduced iron Throughout; common fine prominent irregular black (10YR 2/1) organic streaking throughout; gradual wavy boundary. Lab sample # 17N03244

Eg2--20 to 115 centimeters (7.9 to 45.3 inches); 90 percent yellowish brown (10YR 5/4) and 10 percent dark grayish brown (10YR 4/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 2 percent medium distinct irregular ironstone nodules Throughout and 3 percent fine distinct irregular ironstone nodules Throughout and 5 percent fine prominent irregular 7.5YR 5/6), moist, masses of reduced iron Throughout and 10 percent fine prominent irregular 7.5YR 5/6), moist, masses of reduced iron Throughout; common fine prominent irregular very dark grayish brown (10YR 3/2) organic streaking throughout; clear wavy boundary. Lab sample # 17N03245

Bh/Eg--115 to 203 centimeters (45.3 to 79.9 inches); 60 percent very dark gray (10YR 3/1) and 40 percent dark gray (10YR 4/1) fine sand; weak fine angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; .

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 28 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_027

Site ID: S2017FL097027

Pedon ID: S2017FL097027

Site Note: The plants described on this site correlates well to the legacy ecological site 6-South Florida Flatwoods. The site 6-South Florida Flatwoods correlates well to Pine Flatwoods and Dry Prairie (Mesic Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name is Immokalee fine sand. The Component Pedon was Smyrna. This Pedon or Soil Series is a dissimilar soil inclusion and is part of the map unit composition. Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; This site was DSNY-027; it was sampled about 9 meters (30 feet) at 225 degrees of the SW_027 corner. This was north facing of the pit, the aspect was 135 degrees, on a 1.5 % gradient. This Pedon is representative of the Smyrna Series and representative of the map unit concept and site.; Seasonal high water table at 3 centimeters (1 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0645

Soil Name as Described/Sampled: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Soil Name as Correlated: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: on talf tread of flat on marine terrace on coastal plain

Upslope Shape: linear

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 28 cm.
albic horizon 13 to 28 cm.
spodic horizon 28 to 38 cm.

Country:

State: Florida

County: Osceola

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL097 -- Osceola County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 16 -- Immokalee fine sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0920620

Std Longitude: -81.4053250

Latitude: 38 degrees 5 minutes 31.42 seconds north

Longitude: 81 degrees 24 minutes 19.17 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 460181 meters

UTM Northing: 3107467 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: Florida slash pine, large gallberry, longleaf pine, saw palmetto, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL097027 **Pedon ID:** S2017FL097027

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	19.0	135	22.0			1,300	360	very poorly		

A--0 to 13 centimeters (0.0 to 5.1 inches); black (10YR 2/1) fine sand, very dark gray (10YR 3/1), dry; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout and common coarse roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03246

Eg--13 to 28 centimeters (5.1 to 11.0 inches); gray (10YR 6/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and many fine roots throughout and common coarse roots throughout; common fine and medium prominent irregular light gray (10YR 7/1) stripped matrixes throughout, common fine and medium prominent irregular black (10YR 2/1) organic streaking throughout; clear wavy boundary. Lab sample # 17N03247

Bh1--28 to 33 centimeters (11.0 to 13.0 inches); black (10YR 2/1) fine sand; weak fine angular blocky, and weak medium angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; gradual wavy boundary. Lab sample # 17N03248

Bh2--33 to 38 centimeters (13.0 to 15.0 inches); dark brown (7.5YR 3/2) fine sand; weak fine angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; gradual broken boundary. Lab sample # 17N03249

Bw--38 to 58 centimeters (15.0 to 22.8 inches); brown (10YR 5/3) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 5 percent faint 10YR 3/1), moist, organic stains on surfaces along root channels; 3 percent fine prominent spherical 10YR 5/4), moist, masses of reduced iron Throughout; spodic tongues; gradual wavy boundary. Lab sample # 17N03250

Cg--58 to 203 centimeters (22.8 to 79.9 inches); light brownish gray (10YR 6/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; 3 percent medium prominent spherical 10YR 5/4), moist, masses of reduced iron Throughout and 10 percent fine prominent spherical 10YR 5/4), moist, masses of reduced iron Throughout. Lab sample # 17N03251

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Mar 9 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_044

Site ID: S2017FL097044

Pedon ID: S2017FL097044

Site Note: This site was DSNY-044; it was sampled about 12 meters (41 feet) at 225 degrees southwest of the SW_044 corner. This was north facing of the pit, the aspect was 135 degrees, on a 1 % gradient. This Pedon is representative of the Smyrna Series and representative of the map unit concept and site.; The Map unit Name is Smyrna fine sand. The Component Pedon was Smyrna. Landscape, vegetation and hydrology of this site fits the mapping concept of the area.; Seasonal high water table at 20 centimeters (8 inches).; The plants described on this site correlates well to the legacy ecological site 6-South Florida Flatwoods. FNAI described this particular area as open land or urban. The area was altered from a Flatwood to an improved pasture or cropland in the past. The natural water flow of the area has been restored and prescribed fire has been used to try to restore the area back to a Flatwood. Majority of the plants are grasses but these correlate well with Pine Flatwoods and Dry Prairie (Mesic Flatwoods from FNAI Natural Communities of Florida publication.

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0647

Soil Name as Described/Sampled: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Soil Name as Correlated: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: on talf tread of flatwoods on marine terrace on coastal plain

Upslope Shape: linear

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Country:

State: Florida

County: Osceola

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL097 -- Osceola County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 42 -- Smyrna fine sand

Pit Location:

Quad Name: Lake Tohopekaliga, Florida

Std Latitude: 28.1260270

Std Longitude: -81.4338490

Latitude: 28 degrees 7 minutes 33.70 seconds north

Longitude: 81 degrees 26 minutes 1.86 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 457392 meters

UTM Northing: 3111239 meters

Primary Earth Cover: Grass/herbaceous cover

Secondary Earth Cover: Tame pastureland

Existing Vegetation: arrowhead, bahiagrass, bluestem, cabbage palmetto, longleaf pine, saw palmetto, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL097044 **Pedon ID:** S2017FL097044

Diagnostic Features: ochric epipedon 0 to 48 cm.
albic materials 20 to 48 cm.
spodic horizon 48 to 58 cm.
spodic materials 56 to 86 cm.
albic horizon 86 to 165 cm.
spodic horizon 165 to 203 cm.

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	19.0	135	22.0			1,300	360	poorly		

Ap--0 to 20 centimeters (0.0 to 7.9 inches); dark gray (10YR 4/1) fine sand, gray (10YR 6/1), dry; weak fine granular structure; loose, loose, nonsticky, nonplastic; nonfluid; many fine roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03256

E--20 to 48 centimeters (7.9 to 18.9 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many fine roots throughout; common medium distinct spherical white (10YR 8/1) stripped matrix throughout, common fine and medium prominent irregular very dark grey (10YR 3/1) organic streaking throughout; clear smooth boundary. Lab sample # 17N03257

Bh1--48 to 53 centimeters (18.9 to 20.9 inches); black (10YR 2/1) fine sand; moderate fine angular blocky, and moderate medium angular blocky structure; hard, friable, Weakly cemented, nonsticky, nonplastic; nonfluid; common fine roots throughout; gradual wavy boundary. Lab sample # 17N03258

Bh2--53 to 58 centimeters (20.9 to 22.8 inches); dark reddish brown (5YR 3/2) fine sand; moderate fine angular blocky, and moderate medium angular blocky structure; slightly hard, friable, Weakly cemented, nonsticky, nonplastic; nonfluid; common fine roots throughout; gradual wavy boundary. Lab sample # 17N03259

Bw--58 to 86 centimeters (22.8 to 33.9 inches); brown (10YR 5/3) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common fine roots throughout; 10 percent medium prominent spherical extremely weakly cemented 5YR 3/2), moist, and 5YR 4/6), moist, iron-manganese nodules Throughout; 5YR 3/2), moist, and 5YR 4/6), moist, ortstein nodules; gradual wavy boundary. Lab sample # 17N03260

E'g1--86 to 114 centimeters (33.9 to 44.9 inches); light brownish gray (10YR 6/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common fine roots throughout; 10 percent medium prominent spherical extremely weakly cemented 5YR 3/2), moist, and 5YR 4/6), moist, iron-manganese masses Throughout; 10YR 5/6), moist, and 10YR 3/1), moist, ortstein nodules; clear smooth boundary. Lab sample # 17N03261

E'g2--114 to 165 centimeters (44.9 to 65.0 inches); light brownish gray (10YR 6/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; clear wavy boundary.

B'h--165 to 203 centimeters (65.0 to 79.9 inches); very dark gray (10YR 3/1) fine sand; structureless massive; slightly hard, friable, nonsticky, nonplastic; nonfluid; .

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 9 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_002

Site ID: S2017FL105002

Pedon ID: S2017FL105002

Site Note: The plants described on this site correlates well to the legacy ecological site 6-South Florida Flatwoods. The site 6-South Florida Flatwoods correlates well to Pine Flatwoods and Dry Prairie (Mesic Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name is EauGallie fine sand and the Component Pedon was EauGallie fine sand. Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; Seasonal high water table at 25 centimeters (10 inches).; This site was DSNY-002; it was sampled about 12 meters (41 feet) at 225 degrees southwest of the SW_002 corner. This was north facing of the pit, the aspect was 45 degrees, on a 1 % gradient. This Pedon is representative of the EauGallie Series and representative of the map unit concept and site.

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0648

Soil Name as Described/Sampled: Eaugallie

Classification: Sandy, siliceous, hyperthermic Alfic Alaquods

Soil Name as Correlated: Eaugallie

Classification: Sandy, siliceous, hyperthermic Alfic Alaquods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: on talf tread of flatwoods on marine terrace on coastal plain

Upslope Shape: linear

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 50 cm.
albic horizon 25 to 50 cm.
spodic horizon 50 to 77 cm.
argillic horizon 135 to 203 cm.

Country:

State: Florida

County: Polk

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL105 -- Polk County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 5 -- EauGallie fine sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0481160

Std Longitude: -81.4170610

Latitude: 28 degrees 2 minutes 53.22 seconds north

Longitude: 81 degrees 25 minutes 1.42 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 459012 meters

UTM Northing: 3102603 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: bluestem, fetterbush lyonia, Florida slash pine, large gallberry, saw palmetto, wiregrass gentian

Parent Material: Sandy over Loamy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL105002 **Pedon ID:** S2017FL105002

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	16.0	90	22.0			1,300	360	poorly		

A--0 to 25 centimeters (0.0 to 9.8 inches); black (10YR 2/1) fine sand; weak fine granular structure; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; common fine light gray (10YR 7/1) uncoated sand grains; clear wavy boundary. Lab sample # 17N03262

Eg--25 to 50 centimeters (9.8 to 19.7 inches); gray (10YR 5/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; common medium distinct spherical organic streaks very dark gray(10YR 3/1)throughout, E material tonguing and/or interfingering into the Bh horizon; abrupt wavy boundary. Lab sample # 17N03263

Bh1--50 to 58 centimeters (19.7 to 22.8 inches); black (10YR 2/1) fine sand; moderate medium angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common fine roots throughout; gradual wavy boundary. Lab sample # 17N03264

Bh2--58 to 77 centimeters (22.8 to 30.3 inches); dark brown (7.5YR 3/3) fine sand; weak medium angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; gradual broken boundary. Lab sample # 17N03265

E'g--77 to 135 centimeters (30.3 to 53.1 inches); light gray (2.5Y 7/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 5 percent fine prominent spherical 10YR 7/1), moist, iron depletions Throughout and 10 percent fine prominent spherical 10YR 5/6), moist, masses of oxidized iron Throughout; common medium distinct spherical very dark gray (10YR 3/1) organic streaks through ; clear wavy boundary. Lab sample # 17N03266

Btg--135 to 203 centimeters (53.1 to 79.9 inches); light gray (2.5Y 7/1) fine sandy loam; 15 percent clay; moderate medium subangular blocky structure; slightly hard, friable, slightly sticky, slightly plastic; nonfluid; common fine roots throughout; 20 percent distinct 2.5Y 6/), moist, clay bridges between sand grains; 10 percent fine prominent spherical 10YR 6/8), moist, masses of oxidized iron On surfaces along root channels.

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 7 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_005

Site ID: S2017FL105005

Pedon ID: S2017FL105005

Site Note: The plants described on this site correlates well to the legacy ecological site 3-Sand Pine Scrub. The site 3-Sand Pine Scrub correlates well to Pine Flatwoods and Dry Prairie (Mesic Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name is Pomello fine sand and the Component Pedon was Pomello fine sand. Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; Seasonal high water table at 48 centimeters (19 inches).; This site was DSNY-005; it was sampled about 14 meters (46 feet) at 225 degrees southwest of the SW_005 corner, and 2.5 meters (8 feet)at 90 degrees east. This was north facing of the pit, the aspect was 180 degrees, on a 1 % gradient. This Pedon is representative of the Pomello Series and representative of the map unit concept and site.

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0646

Soil Name as Described/Sampled: Pomello

Classification: Sandy, siliceous, hyperthermic Oxyaquic Alorthods

Soil Name as Correlated: Pomello

Classification: Sandy, siliceous, hyperthermic Oxyaquic Alorthods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: microhigh on rise tread of flatwoods
microhigh on rise tread of marine terrace
microhigh on rise tread of coastal plain
microhigh on rise tread of microhigh rise

Upslope Shape: convex

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 86 cm.
albic horizon 10 to 86 cm.
spodic materials 86 to 97 cm.

Country:

State: Florida

County: Polk

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL105 -- Polk County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 22 -- Pomello fine sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0394480

Std Longitude: -81.3934890

Latitude: 28 degrees 2 minutes 22.01 seconds north

Longitude: 81 degrees 23 minutes 36.56 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 461325 meters

UTM Northing: 3101635 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: fetterbush lyonia, Florida slash pine, large gallberry, runner oak, saw palmetto, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL105005 **Pedon ID:** S2017FL105005

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	18.0	180	22.0			1,300	360	somewhat poorly		

A--0 to 10 centimeters (0.0 to 3.9 inches); gray (10YR 5/1) fine sand; weak fine granular structure; loose, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; common fine interstitial pores; clear smooth boundary. Lab sample # 17N03252

E--10 to 86 centimeters (3.9 to 33.9 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and common fine roots throughout and common coarse roots throughout; common fine interstitial pores; below 48 cm few fine faint irregular stripped matrix grayish brown(10YR 5/2) in pores and in roots channels, many medium distinct spherical very dark gray (10YR 3/1)organic streaking throughout; clear smooth boundary. Lab sample # 17N03253

Bh--86 to 97 centimeters (33.9 to 38.2 inches); very dark gray (10YR 3/1) fine sand; moderate medium angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; many fine interstitial pores; clear wavy boundary. Lab sample # 17N03254

Bw--97 to 102 centimeters (38.2 to 40.2 inches); dark yellowish brown (10YR 4/4) fine sand; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; many fine interstitial pores; 2 percent fine distinct spherical 10YR 5/6), moist, masses of oxidized iron Throughout; clear wavy boundary. Lab sample # 17N03255

Cg--102 to 203 centimeters (40.2 to 79.9 inches); light gray (10YR 7/1) fine sand; soft, very friable, nonsticky, nonplastic; nonfluid; 2 percent fine distinct spherical 10YR 5/6), moist, masses of oxidized iron Throughout; few faint spherical very dark gray (10YR 3/1)organic streaking throughout.

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 23 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_009

Site ID: S2017FL105009

Pedon ID: S2017FL105009

Site Note: The plants described on this site correlates well to the legacy ecological site 6-South Florida Flatwoods. The site 6-South Florida Flatwoods correlates well to Pine Flatwoods and Dry Prairie (Wet Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name is Smyrna and Myakka fine sands and the Component Pedon was Smyrna. Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; This site was DSNY-009; it was sampled about 12 meters (41 feet) at 225 degrees of the SW_009 corner.This was north facing of the pit, the aspect was 270 degrees, on a 1 % gradient. This Pedon is representative of the Smyrna Series and representative of the map unit concept and site.; Seasonal high water table at 3 centimeters (1 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0649

Soil Name as Described/Sampled: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Soil Name as Correlated: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: on talf tread of flatwoods on marine terrace on coastal plain

Upslope Shape: linear

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 28 cm.
albic horizon 18 to 28 cm.
spodic horizon 28 to 38 cm.

Country:

State: Florida

County: Polk

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL105 -- Polk County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 17 -- Smyrna and Myakka fine sands

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0729700

Std Longitude: -81.4287530

Latitude: 28 degrees 4 minutes 22.69 seconds north

Longitude: 81 degrees 25 minutes 43.51 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 457872 meters

UTM Northing: 3105360 meters

Primary Earth Cover: Grass/herbaceous cover

Secondary Earth Cover: Tame pastureland

Existing Vegetation: bahiagrass, Florida slash pine, saw palmetto, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL105009 **Pedon ID:** S2017FL105009

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	18.0	270	22.0			1,300	360	very poorly		

A--0 to 18 centimeters (0.0 to 7.1 inches); black (10YR 2/1) fine sand, very dark gray (10YR 3/1), dry; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear wavy boundary. Lab sample # 17N03267

E--18 to 28 centimeters (7.1 to 11.0 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; common fine distinct spherical very dark grayish brown (10YR 3/2) organic streaking throughout; clear smooth boundary. Lab sample # 17N03268

Bh1--28 to 33 centimeters (11.0 to 13.0 inches); black (10YR 2/1) fine sand; weak fine angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common fine roots throughout; gradual broken boundary. Lab sample # 17N03269

Bh2--33 to 38 centimeters (13.0 to 15.0 inches); dark reddish brown (5YR 3/3) fine sand; weak fine angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common fine roots throughout; gradual wavy boundary. Lab sample # 17N03270

Bw--38 to 53 centimeters (15.0 to 20.9 inches); brown (7.5YR 4/3) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common fine roots throughout; 10 percent faint 10YR 3/2), moist, organic stains on surfaces along root channels; 5 percent fine prominent 10YR 6/4), moist, masses of reduced iron Throughout and 10 percent fine prominent 10YR 7/1), moist, iron depletions Throughout; gradual wavy boundary. Lab sample # 17N03271

E'g--53 to 147 centimeters (20.9 to 57.9 inches); light brownish gray (10YR 6/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common fine roots throughout; 5 percent medium prominent 10YR 5/6), moist, masses of reduced iron Throughout and 10 percent fine distinct 10YR 7/1), moist, iron depletions Throughout; clear smooth boundary. Lab sample # 17N03272

B'h--147 to 203 centimeters (57.9 to 79.9 inches); black (10YR 2/1) fine sand; moderate fine angular blocky, and moderate medium angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; .

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 16 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_011

Site ID: S2017FL105011

Pedon ID: S2017FL105011

Site Note: This site was DSNY-011; it was sampled about 8 meters (26 feet) at 200 degrees southwest of the SW_011 corner. This was north facing of the pit, the aspect was 135 degrees, on a 1 % gradient. This Pedon is representative of the Smyrna Series and representative of the map unit concept and site.; The Map unit Name is Smyrna and Myakka fine sand. The Component of the Pedon is Smyrna. Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; The plants described on this site correlates well with the legacy ecological site 6-South Florida Flatwoods for the areas no subject to burning. The site 6-South Florida Flatwoods does not correlate well to Hardwood Forested Wetlands (Mesic Hammock), but it may fit with Freshwater Forested Wetlands (Hydric Hammock) on the dry site.; Seasonal high water table at 3 centimeters (1 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0650

Soil Name as Described/Sampled: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Soil Name as Correlated: Smyrna

Classification: Sandy, siliceous, hyperthermic Aeric Alaquods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: on talf tread of flat on marine terrace on coastal plain

Upslope Shape: convex

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 41 cm.
albic horizon 18 to 41 cm.
spodic horizon 41 to 71 cm.

Country:

State: Florida

County: Polk

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL105 -- Polk County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 17 -- Smyrna and Myakka fine sands

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0706570

Std Longitude: -81.3840700

Latitude: 28 degrees 4 minutes 14.37 seconds north

Longitude: 81 degrees 23 minutes 2.65 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 462262 meters

UTM Northing: 3105089 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: bluestem, Indiangrass, live oak, saw palmetto

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL105011 **Pedon ID:** S2017FL105011

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	18.0	135	22.0			1,300	360	very poorly		

A--0 to 18 centimeters (0.0 to 7.1 inches); black (10YR 2/1) fine sand, dark gray (10YR 4/1), dry; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout and common coarse roots throughout; few discontinuous distinct gray (10YR 5/1) uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03273

E--18 to 41 centimeters (7.1 to 16.1 inches); 80 percent gray (10YR 5/1) and 20 percent gray (10YR 6/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and many fine roots throughout and common coarse roots throughout; common fine and medium distinct spherical light gray (10YR 7/1) stripped matrixes throughout, common fine distinct spherical very dark grayish brown (10YR 3/2) organic streaking throughout; clear smooth boundary. Lab sample # 17N03274

Bh1--41 to 51 centimeters (16.1 to 20.1 inches); black (10YR 2/1) fine sand; moderate medium angular blocky structure; hard, firm, nonsticky, nonplastic; nonfluid; many medium roots throughout and common fine roots throughout; clear wavy boundary. Lab sample # 17N03275

Bh2--51 to 71 centimeters (20.1 to 28.0 inches); dark brown (7.5YR 3/3) fine sand; moderate medium angular blocky structure; moderately hard, firm, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; gradual wavy boundary. Lab sample # 17N03276

Bw1--71 to 142 centimeters (28.0 to 55.9 inches); brown (7.5YR 4/3) fine sand; weak fine angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 5 percent prominent 10YR 3/2), moist, organic stains on surfaces along root channels. Lab sample # 17N03277

Bw2--142 to 173 centimeters (55.9 to 68.1 inches); brown (7.5YR 5/3) fine sand; weak fine angular blocky structure; slightly hard, friable, nonsticky, nonplastic; nonfluid; common fine distinct spherical very dark grayish brown (10YR 3/2) organic streaking throughout.

Cg--173 to 203 centimeters (68.1 to 79.9 inches); light gray (7.5YR 7/1) loamy fine sand; 9 percent clay; weak fine granular structure; soft, very friable, slightly sticky, nonplastic; nonfluid; .

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 14 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_018

Site ID: S2017FL105018

Pedon ID: S2017FL105018

Site Note: The plants described on this site correlates well to the legacy ecological site 6-South Florida Flatwoods. The site 6-South Florida Flatwoods correlates well to Pine Flatwoods and Dry Prairie (Mesic Flatwoods) from FNAI Natural Communities of Florida publication.; This pedon or soil series is an inclusion within the map unit Malabar fine sand. This minor component is part of the SDJR DMU of Malabar fine sand in MLRA155.Landscape, vegetation and hydrology of this site fits the mapping concept of the area. ; This site was DSNY-018; it was sampled about 2 meters (7 feet) at 225 degrees southwest of the SW_018 corner. This was north facing of the pit, the aspect was 180 degrees, on a 1 % gradient. This Pedon a minor component inclusion with in the Malabar fine sand map unit. The site is representative of the Oldsmar Series and representative of the map unit concept.; Seasonal high water table at 20 centimeters (8 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0651

Soil Name as Described/Sampled: Oldsmar

Classification: Sandy, siliceous, hyperthermic Alfic Arenic Alaquods

Soil Name as Correlated: Oldsmar

Classification: Sandy, siliceous, hyperthermic Alfic Arenic Alaquods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: on talf tread of flatwoods on marine terrace on coastal plain

Upslope Shape: linear

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 104 cm.
albic horizon 10 to 104 cm.
spodic horizon 104 to 117 cm.
argillic horizon 117 to 203 cm.

Country:

State: Florida

County: Polk

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL105 -- Polk County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 10 -- Malabar fine sand, 0 to 2 percent slopes

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0611140

Std Longitude: -81.4264930

Latitude: 28 degrees 3 minutes 40.01 seconds north

Longitude: 81 degrees 25 minutes 35.38 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 458090 meters

UTM Northing: 3104046 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: bluestem, Florida slash pine, saw palmetto, wax myrtle, wiregrass gentian

Parent Material: sandy over loamy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL105018 **Pedon ID:** S2017FL105018

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	17.0	180	22.0			1,300	360	poorly		

A--0 to 10 centimeters (0.0 to 3.9 inches); black (10YR 2/1) fine sand; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout and common coarse roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03278

Eg1--10 to 23 centimeters (3.9 to 9.1 inches); gray (10YR 5/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and common fine roots throughout; common fine faint spherical gray (10YR 6/1)stripped matrix throughout; gradual wavy boundary. Lab sample # 17N03279

Eg2--23 to 46 centimeters (9.1 to 18.1 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; common fine faint spherical gray (10YR 6/1)stripped matrix throughout, few medium distinct spherical very dark gray (10YR 3/1) organic streaking throughout; gradual wavy boundary. Lab sample # 17N03280

Eg3--46 to 104 centimeters (18.1 to 40.9 inches); grayish brown (10YR 5/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; 8 percent medium distinct spherical 10YR 5/6), moist, masses of oxidized iron Throughout; many coarse distinct spherical very dark gray (10YR 3/1) organic streaking throughout; gradual wavy boundary. Lab sample # 17N03281

Bh--104 to 117 centimeters (40.9 to 46.1 inches); black (10YR 2/1) fine sand; weak medium angular blocky structure; slightly hard, firm, nonsticky, nonplastic; nonfluid; gradual wavy boundary.

Bt--117 to 203 centimeters (46.1 to 79.9 inches); brown (10YR 4/3) sandy clay loam; 30 percent clay; moderate medium angular blocky structure; moderately hard, firm, slightly sticky, slightly plastic; nonfluid; 20 percent distinct 7.5YR 3/3), moist, clay films on all faces of peds; 3 percent medium distinct spherical 10YR 5/6), moist, masses of oxidized iron Throughout.

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 21 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_019

Site ID: S2017FL105019

Pedon ID: S2017FL105019

Site Note: This site was DSNY-019; it was sampled about 12 meters (41 feet) at 210 degrees southwest of the SW_019 corner. This was north facing of the pit, the aspect was 135 degrees, on a 1 % gradient. This Pedon is a minor inclusion of the Duette fine sand the map unit. The Pedon is representative of the map unit concept.; The plants described on this site correlates well to the legacy ecological site 3-Sand Pine Scrub. The site 3-Sand Pine Scrub correlates well to Pine Flatwoods and Dry Prairie (Scrubby Flatwoods) from FNAI Natural Communities of Florida publication.; This Pedon or Soil Series is an inclusion within the map unit Duette fine sand. This minor component is similar to Duette and are in lower positions. Pomello is part of the local map unit composition. Landscape, vegetation and hydrology of this site fits the mapping concept of the area.; Seasonal high water table at 83 centimeters (33 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0652

Soil Name as Described/Sampled: Pomello

Classification: Sandy, siliceous, hyperthermic Oxyaquic Alorthods

Soil Name as Correlated: Pomello

Classification: Sandy, siliceous, hyperthermic Oxyaquic Alorthods

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: microhigh on rise tread of flatwoods on marine terrace on coastal plain
microhigh on rise tread of microhigh rise on marine terrace on coastal plain

Upslope Shape: convex

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 140 cm.
albic horizon 10 to 140 cm.
spodic horizon 140 to 191 cm.

Country:

State: Florida

County: Polk

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL105 -- Polk County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 70 -- Duette fine sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0746580

Std Longitude: -81.3948280

Latitude: 28 degrees 4 minutes 28.77 seconds north

Longitude: 81 degrees 23 minutes 41.38 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 461206 meters

UTM Northing: 3105536 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: Chapman oak, Florida slash pine, longleaf pine, myrtle oak, sand live oak, saw palmetto, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL105019 **Pedon ID:** S2017FL105019

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.5	19.0	135	22.0			1,300	360	somewhat poorly		

A--0 to 10 centimeters (0.0 to 3.9 inches); gray (2.5Y 5/1) fine sand, gray (2.5Y 6/1), dry; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; clear smooth boundary. Lab sample # 17N03282

E1--10 to 67 centimeters (3.9 to 26.4 inches); 80 percent light brownish gray (10YR 6/2) and 20 percent light gray (10YR 7/1) fine sand; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout and common coarse roots throughout; 5 percent faint 10YR 3/2), moist, organic stains on surfaces along root channels; gradual wavy boundary. Lab sample # 17N03283

E2--67 to 140 centimeters (26.4 to 55.1 inches); light gray (10YR 7/1) fine sand; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 3 percent faint 10YR 3/2), moist, organic stains on surfaces along root channels; 3 percent fine prominent spherical 10YR 7/6), moist, masses of oxidized iron Throughout; common fine prominent spherical very dark grayish brown (10YR 3/2) organic streaking throughout; clear wavy boundary. Lab sample # 17N03284

Bh--140 to 191 centimeters (55.1 to 75.2 inches); very dark grayish brown (10YR 3/2) fine sand; slightly hard, very friable, nonsticky, nonplastic; nonfluid; clear wavy boundary.

Cg--191 to 203 centimeters (75.2 to 79.9 inches); gray (10YR 5/1) fine sand; loose, loose, nonsticky, nonplastic; nonfluid; .

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Mar 2 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_022

Site ID: S2017FL105022

Pedon ID: S2017FL105022

Site Note: This site was DSNY-022; it was sampled about 5 meters (17 feet) at 225 degrees the SW_022 corner. This was north facing of the pit, the aspect was 135 degrees, on a 1 % gradient. This Pedon is representative of the Satellite series and fits the mapping concept of the area.; The plants described on this site correlates well to the legacy ecological site 6-South Florida Flatwoods. The site 6-South Florida Flatwoods correlates well to Pine Flatwoods and Dry Prairie (Mesic Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name is Immokalee sand. The Component Pedon was Satellite. This is a minor inclusion that was not mnapped of included within the mapunit composition. The hydrology of this site is dryer of what it is normally, but wet enough to support a Mesic Flatwoods vegetation. These Micro High areas within Immokalee sand map unit are common on the area but too small to be mapped or seperated at the scale of mapping 1:24,000.; Seasonal high water table at 48 centimeters (19 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0643

Soil Name as Described/Sampled: Satellite

Classification: Hyperthermic, uncoated Aquic Quartzipsamments

Soil Name as Correlated: Satellite

Classification: Hyperthermic, uncoated Aquic Quartzipsamments

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: microhigh on rise tread of flatwoods on marine terrace on coastal plain
microhigh on rise tread of microhigh rise on marine terrace on coastal plain

Upslope Shape: concave

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: aquic conditions 48 to 203 cm.

Country:

State: Florida

County: Polk

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL105 -- Polk County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 21 -- Immokalee sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0831070

Std Longitude: -81.3923700

Latitude: 28 degrees 4 minutes 59.19 seconds north

Longitude: 81 degrees 23 minutes 32.53 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 461451 meters

UTM Northing: 3106471 meters

Primary Earth Cover: Tree cover

Secondary Earth Cover: Other tree cover

Existing Vegetation: Chapman oak, Florida slash pine, longleaf pine, runner oak, saw palmetto, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL105022 **Pedon ID:** S2017FL105022

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	19.0	135	22.0			1,300	360	somewhat poorly		

A--0 to 13 centimeters (0.0 to 5.1 inches); dark gray (10YR 4/1) fine sand, gray (10YR 6/1), dry; weak fine granular structure; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout and common coarse roots throughout; common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03240

C1--13 to 49 centimeters (5.1 to 19.3 inches); light brownish gray (10YR 6/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; many medium roots throughout and many fine roots throughout; 5 percent distinct 10YR 3/1), moist, organic stains on surfaces along root channels; common fine and medium distinct spherical very dark gray (10YR 3/1) organic streaking throughout; clear wavy boundary. Lab sample # 17N03241

C2--49 to 152 centimeters (19.3 to 59.8 inches); light gray (10YR 7/1) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout and common coarse roots throughout; 4 percent distinct 10YR 3/1), moist, organic stains on surfaces along root channels; 5 percent fine distinct spherical 10YR 5/4), moist, masses of oxidized iron Throughout; common fine and medium distinct spherical very dark gray (10YR 3/1) organic streaking throughout; gradual wavy boundary. Lab sample # 17N03242

C3--152 to 203 centimeters (59.8 to 79.9 inches); grayish brown (10YR 5/2) fine sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; 3 percent fine distinct spherical 10YR 5/4), moist, masses of reduced iron Throughout.

PEDON DESCRIPTION -- NEON Site DSNY

Print Date: May 22 2018

Description Date: Feb 23 2017

Describer: Martin Figueroa, Craig Prink and Jimmy Maynes

NEON Plot ID: DSNY_036

Site ID: S2017FL105036

Pedon ID: S2017FL105036

Site Note: The plants described on this site correlates well to the legacy ecological site 6-South Florida Flatwoods. The site 6-South Florida Flatwoods correlates well to Pine Flatwoods and Dry Prairie (Mesic Flatwoods) from FNAI Natural Communities of Florida publication.; The Map unit Name is Immokalee sand. The Pedon Component name was Pompano. Pompano soil was not mapped or included within the mapunit composition as an inclusion. Pompano is dissimilar to Immokalee but occurs on the same landscapes. The Pompano inclusion fits the Landscape, vegetation and hydrology of the area. This inclusion is representative of the mapping concept of the area.; This site was DSNY-036; it was sampled about 12 meters (41 feet) at 225 degrees of the SW_036 corner.This was north facing of the pit, the aspect was 45 degrees, on a 1 % gradient. This Pedon is representative of the Pompano Series and representative of the map unit concept and site.; Seasonal high water table at 56 centimeters (22 inches).

Pedon Note:

Lab Source ID: KSSL

Lab Pedon #: 17N0653

Soil Name as Described/Sampled: Pompano

Classification: Siliceous, hyperthermic Typic Psammaquents

Soil Name as Correlated: Pompano

Classification: Siliceous, hyperthermic Typic Psammaquents

Pedon Type: undefined observation

Pedon Purpose: research site

Taxon Kind: series

Associated Soils:

Physiographic Division:

Physiographic Province:

Physiographic Section:

State Physiographic Area:

Local Physiographic Area:

Geomorphic Setting: on talf tread of flat on marine terrace on coastal plain

Upslope Shape: linear

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

Description origin: Pedon PC 6.3

Diagnostic Features: ochric epipedon 0 to 18 cm.
aquic conditions 0 to 203 cm.

Country:

State: Florida

County: Polk

MLRA: 155 -- Southern Florida Flatwoods

Soil Survey Area: FL105 -- Polk County, Florida
7-FOR -- Ft. Myers, Florida

Map Unit: 21 -- Immokalee sand

Pit Location:

Quad Name: Lake Hatchineha, Florida

Std Latitude: 28.0603380

Std Longitude: -81.3847440

Latitude: 28 degrees 3 minutes 37.22 seconds north

Longitude: 81 degrees 23 minutes 5.08 seconds west

Datum: WGS84

UTM Zone: 17

UTM Easting: 462192 meters

UTM Northing: 3103946 meters

Primary Earth Cover: Grass/herbaceous cover

Secondary Earth Cover: Tame pastureland

Existing Vegetation: panicgrass, wiregrass gentian

Parent Material: sandy marine deposits

Bedrock Kind:

Bedrock Depth:

Bedrock Hardness:

Bedrock Fracture Interval:

Surface Fragments:

Description database: KSSL

Cont. Site ID: S2017FL105036 **Pedon ID:** S2017FL105036

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	18.0	45	22.0			1,300	360	very poorly		

Ap--0 to 18 centimeters (0.0 to 7.1 inches); 60 percent gray (10YR 5/1) and 40 percent black (10YR 2/1) sand, very dark gray (10YR 3/1), dry; weak fine granular structure; soft, very friable, nonsticky, nonplastic; nonfluid; common medium roots throughout and many fine roots throughout; common fine and medium distinct spherical light gray (10YR 7/1) stripped matrix throughout, common light gray (10YR 7/1)uncoated sand grains throughout; clear smooth boundary. Lab sample # 17N03285

C1--18 to 41 centimeters (7.1 to 16.1 inches); grayish brown (10YR 5/2) sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common medium roots throughout and common fine roots throughout; 8 percent distinct 10YR 2/1), moist, organic stains; clear wavy boundary. Lab sample # 17N03286

C2--41 to 203 centimeters (16.1 to 79.9 inches); light gray (10YR 7/1) sand; structureless single grain; loose, loose, nonsticky, nonplastic; nonfluid; common fine roots throughout; 5 percent fine prominent spherical 10YR 5/4), moist, masses of reduced iron Throughout. Lab sample # 17N03287